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ABSTRACT

Three five-hour kits of self-contained materials: Using Simulation to Involve Students, Using Media to Stimulate Inquiry, and Using Evaluation to Improve Instruction, were field tested in sixty-four pre-service and in-service training programs. The kits were based on successful teaching strategies in the High School Geography Project course, Geography in an Urban Age; included participation in an activity, analysis of it, and application of the analysis to other teaching situations; and contained an instructor's guide, participant manual, and supporting media such as slides, maps, and video-tape. Statistical comparisons of four groups of sixteen programs were made, one of which was a control group. Questionnaires revealed a high degree of favorable response from both the 1,400 participants and the 64 instructors while the Basic Attitudes toward Social Studies (BASS) instrument showed fewer conclusive differences between the treatment and control groups. (NH)

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DIFFERENTIAL EFFECTS OF SELF-CONTAINED TEACHER EDUCATION KITS ON PRE- AND IN-SERVICE SOCIAL STUDIES TEACHERS*

by

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During 1969-1970 the High School Geography Project (H.S.G.P.) developed and field-tested three five-hour kits of self-contained materials designed for use in both in-service workshops and pre-service geography and social studies teacher education courses. Although based on some of the most successful teaching strategies in the H.S.G.P. Geography in an Urban Age course, the kits focus on procedures that could be applied in social studies education generally.

The titles of the kits are: Using Simulation to Involve Students, Using Media to Stimulate Inquiry, and Using Evaluation to Improve Instruction. Each kit has a sequence of activity, analysis, and application. There is an instructor's guide, participant's manual, and supporting media such as slides, maps, and video tape. Figure 1, Overview Chart--Using Media to Stimulate Inquiry, illustrates the organization of the kits. On the assumption that experience is the most effective way to learn the advantages and problems of a teaching strategy, the participants are immediately involved in an activity from the H.S.G.P. course. They analyze the procedures that were used, based on their own experience and from studying video tapes of students. Finally, they apply their knowledge of the instructional strategy to another problem or new content. A sample kit, Using Simulation to Involve Students, is available from the American Association of Geographers (1970).

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Parts	Purpose	Procedures	Mater
I - Introduction and Exercise about Three Neighborhoods in New Orleans - 65 minutes	Introduce the participants to the discrepant data procedure through participation in an exercise.	Participants study three residential neighborhoods and try to account for observed socio-economic differences.	3 ste 2 top censu 22 sl
II - Clarification of Discrepant Data Teaching Procedure 35 minutes	Familiarize participants with the elements of the discrepant data procedure.	Through class discussion the instructor clarifies the discrepant data procedure.	1 tra
III - Analysis of an Exercise about the Cultural Characteristics of Cities 50 minutes	Reinforce the participants' understanding of the discrepant data teaching procedure.	Participants view slides of cities around the world in an exercise which uses the discrepant data approach. Participants work in small groups to analyze the exercise.	15 s
IV - Analysis of the Video Tape - 50 minutes	Clarification of the advantages and disadvantages of using media to encourage inquiry.	Participants observe class doing Three Neighborhoods exercise. Discussion focuses on classroom organization and characteristics of teaching.	video
V - Application 50 minutes	Give participants experience in using the discrepant data procedure.	Participants may teach an activity having the discrepant data teaching procedure.	12 sl No

FIGURE I

OVERVIEW CHART--USING MEDIA TO STIMULATE INQUIRY

Purpose	Procedures	Materials
Introduce the participants to the discrepant data procedure through participation in an exercise.	Participants study three residential neighborhoods and try to account for observed socio-economic differences.	3 stereograms 2 topographic maps census tract data 22 slides of neighborhoods
Familiarize participants with the elements of the discrepant data procedure.	Through class discussion the instructor clarifies the discrepant data procedure.	1 transparency
Reinforce the participants' understanding of the discrepant data teaching procedure.	Participants view slides of cities around the world in an exercise which uses the discrepant data approach. Participants work in small groups to analyze the exercise.	15 slides of various cities
Clarification of the advantages and disadvantages of using media to encourage inquiry.	Participants observe class doing Three Neighborhoods exercise. Discussion focuses on classroom organization and characteristics of teaching.	video tape
Give participants experience in using the discrepant data procedure.	Participants may teach an activity having the discrepant data teaching procedure.	12 slides of Japan and North America

FIGURE I

OVERVIEW CHART--USING MEDIA TO STIMULATE INQUIRY

Sixty-four volunteer groups were involved in field trials held during the spring of 1970. Two groups of 16 instructors, each representing pre-service geographic education and in-service social studies classes, as well as 32 instructors representing pre-service social studies, were selected from volunteers. Sixteen instructors of the pre-service social studies group were randomly assigned to a control group. There were approximately 1,400 participants in the 64 classes representing 35 different states.

This paper presents findings related to the following three questions:

1. Is there a significant difference between pre- and post-attitude scores for each of the three treatment groups and the control group in relation to the topics of each kit?

2. Is there a significant difference among the four groups on the post-test attitude scores related to each of the three kits?

3. Do instructors and participants consider each of the three kits to be effective ways to promote learning?

Information was gathered by using a developed instrument, Basic Attitudes Toward Social Studies (B.A.S.S.), as a pre- and post-test and by using questionnaires at the conclusion of each kit. These instruments are found in the appendices. Scott's (1960) Homogeneity Ratio was used to measure the internal consistency of the B.A.S.S. and the subscales corresponding to each of the kits. Figure 2, Scott's Homogeneity Ratio for the B.A.S.S. and Subscales, shows the mean coefficient and the extremes for four administrations of the instrument. Although the Evaluation Scale has a much lower coefficient than the others, it is still considered acceptable as attitude scales do not usually have the high reliability association with cognitive measurement.

FIGURE 2

SCOTT'S HOMOGENEITY RATIO FOR THE BASS AND SUBSCALES

	$\bar{m}$	High	Low
BASS	.788	.849	.737
Simulation	.794	.821	.742
Media	.736	.780	.674
Evaluation	.471	.595	.369

To determine whether there were significant attitude changes in each of the four groups a 2 x 4 repeated measures A N O V A was run for each kit and for each item of the B.A.S.S. T-tests were used to identify pre-post differences for the experimental and control groups.

Figure 3, Pre-Post Differences for the Simulation Kit, summarizes the various tests. Not only was there an F-ratio significant at the .01 level for the summed pre-post means of all groups, but all groups except the Social Studies Experimental also made gains at the .01 level. The gains by the Social Studies Control group could be partially explained by noting that on a questionnaire five out of eleven control group instructors indicated that simulation was a topic considered in their courses.

FIGURE 3

PRE-POST DIFFERENCES FOR THE
SIMULATION KIT

Group	Pre	Post	Test	Significance
All Groups	3.877	4.097	ANOVA	.01
Social Studies X	3.871	4.029	t	.05
Social Studies C	3.896	4.076	t	.01
In-Service	3.957	4.198	t	.01
Geography	3.805	4.068	t	.01

Each of the nine items which constitute the Simulation Subscale improved at the .01 level for all groups. The In-Service groups increased at the .01 level in eight of the nine items with no increase on item 3. They also had the greatest increase in items 6, 44, 47, and 48. Except for item 48, these all relate to the learning outcomes of simulations. The Geography group increased significantly in all areas and showed the greatest increase in items 24 and 43 which deal with role-playing. The Social Studies Experimental group increased significantly in seven items, but, in relation to the other groups, there were no items on which they showed a superior increase. They did not increase on items 44 and 48. The Social Studies

Control groups increased significantly on seven items and did not increase on items 6 and 48. They showed the greatest increase on items 3, 19, and 37. These mainly relate to simulation being a good use of class time.

Figure 4, Pre-Post Differences for the Media Kit, shows that there was no increase on the subscale for each of the groups. The significant F-ratio for all groups could be suspect as the difference between the grouped means is only .050.

FIGURE 4

PRE-POST DIFFERENCES FOR THE MEDIA KIT

Group	Pre	Post	Test	Significance
All Groups	3.787	3.837	ANOVA	.05
Social Studies X	3.702	3.677	t	___
Social Studies C	3.745	3.818	t	___
In-Service	3.834	3.879	t	___
Geography	3.815	3.869	t	___

The lack of significant differences for each group may be explained by consideration of the 12 items included in the Media Subscale. Seven items (7, 9, 30, 33, 39, 40, 45) showed no gain for grouped data while one item (13) showed a significant decrease at the .01 level. Many of the items with no gain actually had negative components. Consequently, those four items (11, 15, 30, 35) which increased significantly were not sufficient to affect the scale averages.

The Social Studies Experimental group increased significantly in the same four areas as did the grouped data. They had the greatest increase of all groups on items 20 and 35. Further, this group decreased significantly on items 13, 30, and 39 which deal with aerial photographs. The Social Studies Control group increased significantly on items 15, 35, and 45. They were the only group to show a significant increase on item 45. The Geography group made significant increases on items 9, 11, 15, and 20 and

made the greatest increases for all groups on items 9 and 11. They also showed a significant decrease on item 13. The In-Service group made significant increases on items 11 and 15 and a significant decrease on item 13. They made a superior increase on item 15.

A striking pattern that emerges from this section is the attitude towards aerial photographs. All the groups which received treatment were less positive about them after the experience than before. On the other hand, the control group's attitude did not change. This change could be attributed to the quality of the photographs, the use of stereoviewers, or the realization of the advantages and problems of using aerial photographs.

Figure 5, Pre-Post Differences for the Evaluation Kit, indicates that the treatment groups made significant increases at the .01 level. The improvement of the control group at the .05 level may be partially accounted for by the questionnaire which indicated that seven of eleven control group instructors considered evaluation an important topic in their courses.

FIGURE 5

PRE-POST DIFFERENCES FOR THE EVALUATION KIT

Groups	Pre	Post	Test	Significance
All Groups	3.303	3.527	ANOVA	.01
Social Studies X	3.368	3.531	t	.01
Social Studies C	3.389	3.497	t	.05
In-Service	3.324	3.556	t	.01
Geography	3.346	3.597	t	.01

Item one was the only item of the nine comprising the Evaluation Subscale that showed no increase for any of the groups. The Geography group increased on seven items and failed to increase on items 1 and 16. They increased more than any other groups on items 10 and 38. The In-Service

group increased at a significant level on six items and did not increase on items 1, 16, and 38. They increased more than any other group on items 21, 25, 31, 41. The Social Studies Experimental group increased on items 4, 10, 25, 38, and 41. They increased more than any other group on item 4. The Social Studies Control group increased on items 4, 10, 25, and 41.

All four groups made increases on items which relate to tests being able to measure affective and a broad range of cognitive outcomes. All increases were at the .01 level except for the control group on items 4, 10, and 41 which were at the .05 level. None of the groups increased on items 1 and 16 which dealt with using tests primarily to give grades and using evaluation data to change teaching procedures.

ANCOVA was used to determine whether there were any differences among the groups on the post-BASS scores for each kit. Planned orthogonal comparisons were employed to detect differences between the control and experimental pre-service social studies groups while the Scheffé test was used for other comparisons. Figure 6 shows the adjusted post-BASS mean scores for each kit with the pre-BASS scores covaried.

FIGURE 6

ADJUSTED POST-BASS MEAN SCORES

Group	Simulation	Media	Evaluation
Social Studies X	4.048	3.735	3.531
Social Studies C	4.068	3.832	3.410
In-Service	4.135	3.862	3.562
Geography	4.137	3.920	3.603

As an inspection of the adjusted scores for the Simulation Subscale would seem to indicate, the F-ratio for that scale was not significant. Further, there were no significant differences among the groups for each of the items on the subscale. These results, combined with those from the

previous section, would seem to indicate that the Simulation Kit was equally effective with all groups. Since the scores for Simulation in Figure 6 are relatively high and the control group was no different from the others, it would be possible to conclude that simulation is a popular topic on the present social studies scene.

The F-ratio for the ANCOVA related to media was significant at the .05 level. Comparison of pairs of means showed that the Geography group was superior to the Social Studies Experimental group. This could probably be explained by reference to the decreases in attitude toward aerial photos exhibited by the Social Studies group.

When individual items from the Media Subscale are considered, the above suggestion is strengthened. On items dealing with air photos (13, 30, 39) both the Geography and Social Studies Control groups were superior to the Social Studies Experimental group. The In-Service group was also superior on item 30. The item measuring confidence towards use of topographic maps (20) exhibited a different pattern as all the treatment groups were superior to the Social Studies Control group. On other items, the Geography group was more positive than the Social Studies Experimental group on the topic of usefulness of slides and filmstrips to introduce problems (item 9) and the In-Service group was superior to the Social Studies Control group on item 15 (census data).

When the above findings are combined with the pre-post results discussed earlier, it is apparent that the Media Kit evoked mixed responses. The differences between the highest mean score of the Geography group and the lowest mean score of the Social Studies Experimental group may be attributed to the kit containing material such as aerial photographs and topographic maps which are more familiar to geographers. The Social Studies Control group does not show the same patterns as the Social Studies Experimental group because they were not exposed to the media used in the kit. Consequently, members of the control group may not have a realistic view of the use of some of the materials in classrooms.

The F-ratio for the ANCOVA for Evaluation was significant at the .01 level. Comparison of the means showed that the Social Studies Experimental and Geography groups were superior to the Social Studies Control group. The F-ratio for differences between the In-Service and Social Studies Control

groups approached significance at the .05 level.

The superior gains of the treatment groups in relation to the control group is reflected in the results of individual consideration of items 4, 10, and 25. On ability to prepare attitude measures (item 4), the Social Studies Experimental Group was significantly higher than the control group. On items dealing with the ability of tests to measure high level cognitive and affective objectives (items 10 and 25), the three treatment groups were superior to the control group. On item 1, dealing with testing primarily to give grades, both the Geography and Social Studies Control groups were superior to the In-Service group.

When the above results are considered in conjunction with the pre-post results for the Evaluation Subscale, it is obvious that the Evaluation Kit is successful in influencing attitudes in a positive direction.

The participants' and instructors' assessments of the effectiveness of the kits in promoting learning was studied by administering questionnaires in the form of a Likert Scale at the conclusion of each kit and at the end of the treatment. Although instructors were identified, participants were identified by class only.

On the questionnaire, statements were made about each kit and the respondents marked a five point scale ranging from strongly agree to strongly disagree. The responses were scored by assigning five points to the most positive response, four points to the next positive response, and finally one point to the most negative response. Averages were then obtained for each statement and group.

Figure 7, Selected Questionnaire Responses, summarizes the responses of participants and instructors to pertinent items.

As can be seen, both instructors and participants were very positive about the kits. The instructors appear to be more positive than the participants while other data indicates that the in-service groups were more positive than the pre-service groups.

The forty-eight instructors of treatment groups were asked a second series of questions about the kits. The results of these questions are summarized in Figure 8, Instructor Evaluation of Teacher Education Kits.

FIGURE 7

SELECTED QUESTIONNAIRE RESPONSES

	Simulation	Media	Evaluation
Compared to other courses or workshops, this kit is quite interesting.			
Instructors	4.50	4.46	4.54
Participants	3.96	3.76	3.98
I have learned more from this kit than from other education courses or workshops.			
Instructors	4.48	4.38	4.43
Participants	3.96	3.79	3.93
This kit should be used in the basic social studies methods course.			
Instructors	4.24	4.34	4.40
Participants	3.75	3.65	3.79

FIGURE 8

INSTRUCTOR EVALUATION OF TEACHER EDUCATION KITS

	Simulation	Inquiry-Media	Evaluation
Compared to what would normally take place in this methods course or in-service workshop, how effective was this kit? (all instructors)			
Much less effective	-	2%	-
Somewhat less effective	2%	6T	4%
As effective	29%	21%	15%
Somewhat more effective	25%	23%	25%
Much more effective	42%	48%	56%
Will you use this kit again in your methods or in-service class? (all instructors)			
Yes	92%	94%	92%
No	-	2%	2%
Uncertain	8%	4%	6%
Would this kit be useful in a general methods class? (all instructors)			
Yes	90%	85%	90%
No	6%	-	-
Uncertain	4%	15%	10%

Figure 8 indicates that about 70 per cent of the instructors believed that the kits were more effective than the regular procedures they use while about 50 per cent considered the kits to be much more effective. Over 90 percent of the instructors intend to use the kits again and close to 90 per cent feel that the kits would be useful in a general methods course. Again, the In-Service instructors tended to be most positive as 100 per cent of them intend to use the Media and Evaluation Kits again. The Geographic Education instructors tended to be more positive about the usefulness of the kits in a general methods course with all of them including the Evaluation Kit.

Instructors and participants were encouraged to comment on the features of each of the kits. A selection of comments follows:

Simulation Kit

> Participants learned how to use simulation to encourage student-inquiry and involvement, to develop decision-making skills of students, and train them to work effectively in groups. (Social Studies instructor)

> I was able to fade into the shadows from time to time, letting the situation run on its own momentum. This tended to break down the authoritarian teacher/student stereotype and enabled me to achieve what appeared to be a much better rapport than is more often the case. (Geography instructor)

> Instead of just talking about new material, its uses and values, this kit allowed teachers to experiment with materials before buying and using them in the classroom. The strongest feature of the kit is that the participant can become more involved than in a regular lecture-oriented lesson on simulation. (In-Service participant)

Media Kit

> The strongest feature of this kit is teacher participation throughout. Anytime when you can have a large group of teachers come week after week and enjoy a social studies methods workshop, you have a good in-service program. (In-Service instructor)

> It is an excellent unit for stimulating inquiry and it excels in making the students develop concepts, rather than learning facts which would be quickly forgotten. (Social Studies participant)

> This kit presents totally new ideas, at least as far as I am concerned, about teaching social studies. Many of the techniques are original and would prove extremely interesting to a class. (Geography participant)

Evaluation Kit

> The students were highly motivated. Word spread on campus regarding the effective methodology. (Geography instructor)

> This is the best material I have ever seen on evaluation. It showed teachers the "how to" of evaluation rather than talking in generalities as so many materials on evaluation do. (In-Service instructor).

> Until this time I have never thought about giving attitude tests that would not be graded. I think this was a very worthwhile kit. It made me aware of the importance of knowing what my students feel they are learning! This kit was very effective in showing the many different methods of testing and some of the advantages of each. I feel it is important to know these things. (Social Studies participant)

From analysis of the BASS and questionnaire results, the following conclusions apply to the Teacher Education Kits. Although the Simulation Kit did not appear to be more effective than other treatments in influencing attitudes toward the items tested by the BASS, both participants and instructors felt it to be more interesting and useful than other approaches.

Overall, the Media Kit appeared to be more effective with Geographic Education classes than with pre-service social studies groups. Nevertheless, all groups found it to be interesting and worthwhile.

The Evaluation Kit seemed to be most effective as the results on the BASS differentiated between the treatment and control groups. The differences between the groups appeared to center mainly on an increased awareness that objective tests can measure most of the cognitive and affective objectives of teaching. Consequently, the instructors and participants rated the kit as interesting, informative, and useful.

Certainly, a major feature of the Teacher Education Kits is the high degree of involvement required by the participants and the consequent momentum generated by the class. On the basis of the information gathered about the kits, each will be revised and made available for further use with teachers.

APPENDICES

BELIEFS AND ATTITUDES ABOUT SOCIAL STUDIES*

Directions: Indicate your degree of agreement or disagreement with each statement. Mark your responses on the answer sheet provided from left to right as follows.

(SA) Strongly agree (A) Agree (N) Neutral (D) Disagree (SD) Strongly disagree

SIMULATION KIT

3. Educational games shouldn't be used with regularity in high school.

6. Students learn more useful and lasting knowledge from a teacher lecture than from a simulation game.

19. Educational simulations are a good use of class time.

24. Role-playing is a waste of class time.

37. I think I could develop a role-playing activity to use with my students.

43. Role-playing is a good way to learn important concepts.

44. Educational simulations improve student thinking skills.

47. Simulation exercises are a good way of helping students develop more positive attitudes toward other people.

48. Teachers should encourage students to see that decisions made by others may be as good as their own.

MEDIA KIT

7. Using the overhead projector to help students check hypotheses is not worth the time and effort.

9. Slides or filmstrips are a useful way of introducing problems for study.

11. It is important for a teacher to challenge student stereotypes about other people.

13. Using aerial photos in class is not for me.

15. Census data are a valuable source of information for students.

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*Item numbers are included to show original position in the BASS.

20. I feel unsure about how to use topographic maps with my classes.

30. There are more disadvantages than advantages in using aerial photos in class.

33. I can't see much point in regularly using slides or filmstrips in the classroom.

35. Using an overhead projector in the classroom has more advantages than disadvantages.

39. As a teacher, I would be able to use aerial photos in class without much trouble.

40. There are a lot of advantages in using topographic maps for teaching.

45. It takes too much trouble to get things together to use an overhead projector.

EVALUATION KIT

1. I make up tests primarily to give out grades.

4. I can prepare useful measures of student attitudes.

10. Multiple choice questions can be used to evaluate student understanding as well as knowledge of facts.

16. I expect to use evaluation data to change my teaching procedures and materials.

21. It is almost impossible to measure student attitudes.

25. Tests can get at most of the major objectives of education.

31. I have a difficult time testing students for their understanding of concepts.

38. Tests are a poor way of helping students improve their learning.

31. I think I know how to help students develop more positive attitudes toward coal miners.

OTHER ITEMS

2. Video tapes are an effective device for teacher education.

5. When teaching, I like class discussions that lead up to the answer I am seeking.

8. As a teacher, I feel at ease when students are working in groups.

12. I don't like using small group work in my classes.

14. Student attitudes toward learning are not as important as the knowledge students learn.

17. Viewing video tapes of teaching activities won't help me be a better teacher.

18. I feel negative about terms like "inquiry" and "discovery."

22. Field trips are all right for elementary school but not for high school.

23. Student involvement is higher in small group discussions than in class discussions.

26. I feel more comfortable leading a class discussion than lecturing.

27. Field trips are not worth the time and effort.

28. Effective small group work requires a well defined task.

29. The major purpose of a teacher is to get information across to students clearly.

32. Educational field trips are a good use of teaching time.

34. It is more important for a teacher to be a good questioner than a good explainer.

36. Small group work in the classroom tends to be a waste of student time.

42. I feel uncomfortable when students ask questions I can't answer.

46. It doesn't really matter whether students like a subject as long as they learn a lot about it.

Kit Three Participant Evaluation

Directions: Indicate your degree of agreement or disagreement with each statement. Mark your responses on the answer sheet provided from left to right as follows.

(SA) Strongly agree (A) Agree (N) Neutral (D) Disagree (SD) Strongly disagr

1. The "Game of Farming" was a good way to begin the kit.
2. The video tape of high school students playing the game was unnecessary.
3. I still cannot write test questions like those incorporated in the evaluation instrument for the "Game of Farming."
4. I learned most of the ideas in this kit in other courses I have had.
5. I really think I can use evaluation data to make my teaching better.
6. I'm convinced that grading students on their attitudes toward the subject I teach is a good idea.
7. This kit needs to be better organized.
8. The programmed exercise that was assigned was really dull.
9. The programmed exercise was a useful way of presenting information.
10. The assigned readings were confusing.
11. I think I know how to go about measuring student attitudes now.
12. There was too much class discussion in this kit.
13. Essay questions provide the most reliable tests for grading purposes.
14. I can't write an objective test item any better than I could before.
15. The application section of the kit was very useful.
16. I need more opportunities to apply what I learned from the kit.
17. Compared to what happens in other courses or workshops, this kit has been quite interesting.
18. The kit needs major revisions before further use.
19. This kit should be used in the basic social studies methods course.
20. I have learned less from this kit than from other education courses or workshops.

On the other side of this sheet please discuss a) the strongest feature of this kit; b) the weakest feature of this kit and what, if anything, can be done to correct it. Then detach this sheet and give it to your instructor.

REFERENCES

Carswell, Ronald J. B. and Robert M. Cason. Using Media to Stimulate Inquiry (Provisional Edition). Boulder: High School Geography Project of the Association of American Geographers, 1970.

Kurfman, Dana G. and Ina M. Philips. Using Simulation to Involve Students (Provisional Edition). Boulder: High School Geography Project of the Association of American Geographers, 1970. Available from the Association of American Geographers, 1146 - 16 Street N.W., Washington, D.C. for $1.25.

Patton, D. J. (ed). From Geographic Discipline to Inquiring Student: Final Report of the High School Geography Project. Washington, D.C.: Association of American Geographers, 1970.

Richburg, Robert. Using Evaluation to Improve Instruction (Provisional Edition). Boulder: High School Geography Project of the Association of American Geographers, 1970.

Scott, William A. "Measures of Test Homogeneity," Educational and Psychological Measurement, XX(No.4, 1960), 751-757.